| <br>ex of Clair |  |
|-----------------|--|
|                 |  |

Application/Control No.

10/613,739 Examiner

Timothy M. Brown

Applicant(s)/Patent under Reexamination

KRIEG, ARTHUR M.

Art Unit

1648

| √ | Rejected |
|---|----------|
| _ | Allowed  |

| _ | (Through numeral)<br>Cancelled |
|---|--------------------------------|
| ÷ | Restricted                     |

| 2 | Non-Elected  |  |
|---|--------------|--|
| _ | Interference |  |

| A | Appeal   |
|---|----------|
| 0 | Objected |

|              |                      | _                   | Ĺ        |  |              |          |          |          |          |                |   |       |                    |  |              |          |          |          |          |          |               |                                     |     |          | l L        | _ |
|--------------|----------------------|---------------------|----------|--|--------------|----------|----------|----------|----------|----------------|---|-------|--------------------|--|--------------|----------|----------|----------|----------|----------|---------------|-------------------------------------|-----|----------|------------|---|
|              |                      |                     |          |  |              |          |          |          |          |                |   |       |                    |  |              |          |          |          |          |          |               |                                     | ı   |          |            | _ |
| Cla          | aim                  | ļ.,                 | _        | ,  | [            | Date     | <u> </u> |          |          | _              |   | Cla   | aim                | _  | _            |          |          | ate      | •        | _        |               | _                                   |     | Cla      | aim        | _ |
| _            | क्र                  | 11                  | Ł        |  |              |          |          |          |          |                |   | -     | <u> </u>           | 뽀  | -            |          |          |          |          |          |               |                                     |     | !        | ल          |   |
| Final        | Original             | 6                   | <b>├</b> |  |              |          |          |          |          |                |   | Final | Original           | وا   |              |          |          |          |          |          |               |                                     |     | Final    | Original   |   |
| Į i <u>E</u> | 8                    | 05                  | 1        |  |              |          |          |          |          |                |   | II.   | 8                  | 9  |              |          |          |          |          |          |               |                                     |     | ш        | ठि         |   |
|              |                      | -                   | <u> </u> | <u> </u>   | L.           | <u> </u> |          | <u> </u> | _        |                |   |       |                    | <u> </u>   | $\vdash$     |          |          | Щ        |          |          |               |                                     |     |          |            | _ |
| <u> </u>     | 1                    | 7                   | <u> </u> | ⊢  |              | _        | <u> </u> |          | _        | _              |   | -     | 51                 | 7  | <u> </u>     | -        |          | _        |          | _        |               | _                                   | ŀ   |          | 101        |   |
| <u> </u>     | 2                    | Н                   | <b>!</b> | ┝  | -            | <u> </u> |          |          | L        | <del> </del>   |   |       | 52                 | H  | -            | Н        |          | -        |          | _        | -             |                                     |     |          | 102<br>103 |   |
|              | 3                    | ₩                   | ├        | ┡  |              | $\vdash$ | H        | H        | -        | ├              |   |       | 53<br>54           | Н  | -            |          |          | _        |          |          |               |                                     |     |          | 103        |   |
| -            | 5                    | H                   | ├        | ├  |              | -        | -        | -        | -        |                |   |       | 55                 | H  | $\vdash$     |          | -        | _        |          | -        | $\vdash$      |                                     |     |          | 105        | _ |
| -            | 6                    | H                   | ┢┈       | ╁  | ⊢            |          | -        | $\vdash$ | ⊢        | $\vdash$       |   |       | 56                 | Н  | $\vdash$     |          |          |          |          |          |               |                                     | 1   |          | 106        | _ |
|              | 7                    | ╫                   | ╁╾       | $\vdash$   | $\vdash$     | ┢        |          | $\vdash$ | $\vdash$ |                |   |       | 57                 | H  |              | $\vdash$ |          |          | _        |          |               |                                     |     |          | 107        |   |
|              | 8                    | H                   | ┢        | ┢  | $\vdash$     | ┢        |          | $\vdash$ | ┢┈       | $\vdash$       |   |       | 58                 | Н  |              |          |          | _        |          |          |               | -                                   |     |          | 108        | _ |
|              | 9                    | +                   | ╁        | <del>                                     </del> |              |          |          | $\vdash$ | $\vdash$ | ┢              |   |       | 35                 | <u> </u>   | -            | _        |          |          |          |          |               |                                     |     |          | 109        | _ |
| <del></del>  | 10                   | H                   | $\vdash$ | ┢  |              | _        |          | $\vdash$ | $\vdash$ | $\vdash$       |   |       | 菱                  |  |              |          |          |          |          |          |               |                                     |     |          | 110        | _ |
|              | 11                   | #                   | <u> </u> | T  | ┢            |          |          | T        |          | Г              |   |       | 64                 |  |              |          |          |          |          |          |               |                                     | Ì   |          | 111        | _ |
|              | 12                   | I                   | T        | ┢  | T            |          |          | Г        | Т        | ┢              |   |       | 192                | $\vdash$   |              |          |          |          |          |          |               |                                     |     |          | 112        |   |
|              | 13                   | 11                  | Г        |  | T            |          |          |          |          |                |   |       | 183                |  |              |          |          |          |          |          |               |                                     |     |          | 113        |   |
|              | 14                   | 11                  | T        |  |              |          |          |          |          |                |   |       | 64                 | 2  |              |          |          |          |          |          |               |                                     |     |          | 114        | _ |
|              | 15                   | 1                   |          |  |              |          |          |          |          |                |   |       | 65                 | 1  |              |          |          |          |          |          |               |                                     |     |          | 115        |   |
|              | 16                   | Т                   |          |  | l            |          |          |          |          |                | 1 |       | 66                 | T  |              |          |          |          |          |          |               |                                     |     |          | 116        |   |
|              | 17                   | П                   |          |  |              |          |          |          |          |                |   |       | 经                  |  |              |          |          |          |          |          |               |                                     |     |          | 117        |   |
|              | 18                   | П                   |          |  |              |          |          |          |          |                |   |       |                    |  |              |          |          |          |          |          |               |                                     |     |          | 118        |   |
|              | 19                   | $\Pi$               |          | _  | L            |          |          |          |          |                |   |       | THE                |  |              |          |          |          |          |          |               |                                     |     |          | 119        |   |
|              | 20                   | Ш                   |          | _  | 乚            | L.       |          | L.       |          |                |   |       |                    | L_   |              |          |          |          |          |          |               |                                     |     |          | 120        |   |
|              | 21                   | 1                   | L        | L  | L            |          |          |          |          |                |   |       | 71                 | 1  |              |          |          |          |          |          |               |                                     |     |          | 121        |   |
|              | N                    | <u> </u>            | <u> </u> | <u>_</u>   | <u>L</u>     | _        | <u> </u> | L        | _        |                | l |       | 72                 | 1  |              | L        |          |          |          |          |               |                                     |     |          | 122        | _ |
| ļ            | 23                   | È                   | _        | <u> </u>   | <u> </u>     | _        | <u> </u> |          | _        |                |   |       | 73                 | Ц.   | _            |          |          |          |          |          |               |                                     |     | ļ        | 123        | _ |
|              | No.                  | <u> </u>            | _        | _  | <u> </u>     |          |          | _        | _        |                | Į |       | 74                 | <u> `</u>  | _            | _        |          |          |          |          |               |                                     |     |          | 124        |   |
|              | 1                    | <b> </b> _          | ⊢        | -  | <del> </del> |          | _        | <u> </u> |          | <u> </u>       | 1 |       | 26                 | <u> </u>   | _            |          |          |          |          |          |               |                                     |     |          | 125        | _ |
| ļ            |                      | -                   | ├        | -  | ⊢            |          | ├        | ļ        | ⊢        | -              |   |       | <b>3</b>           | 2  | -            | -        |          |          |          | _        | $\vdash$      | _                                   |     | <b></b>  | 126<br>127 | _ |
| -            | 28                   | -                   | -        | ├-   | ⊢            | ┝        | -        | ⊢        | -        | $\vdash$       |   |       | 77<br>78           | 7  | $\vdash$     | H        |          |          |          |          |               |                                     |     | <b></b>  | 128        | _ |
|              | 29                   | 1                   | ├        | ├  | ├            | ┢        | $\vdash$ | -        | ⊢        |                |   |       | 79                 | ₩  | -            |          | _        |          | -        |          |               | _                                   |     |          | 129        | _ |
| -            | 30                   | ╀                   | -        | ┢  | ┼            | $\vdash$ | ├        | -        | -        | -              | 1 |       | 80                 | ╫  |              |          |          |          |          |          |               |                                     |     |          | 130        | _ |
| -            | 31                   | H                   | ┢        |  | <del> </del> | ┢        | -        | ┢        | -        |                | ł | -     | 81                 | <del>    -</del>   | -            | H        | _        |          |          |          | -             |                                     |     |          | 131        | _ |
|              | 32                   | Н                   | ┢        | $\vdash$   | $\vdash$     |          | ┢        | $\vdash$ | $\vdash$ | $\vdash$       | ł |       | 25                 | -  |              |          |          |          |          |          |               |                                     |     |          | 132        | - |
| -            | 33                   | <b>├</b> - <i>╂</i> | $\vdash$ | $\vdash$   | $\vdash$     | $\vdash$ | -        | ╁        | ┝        |                | l |       | <b>188</b>         | $\vdash$   | $\vdash$     |          |          | _        |          |          |               |                                     |     |          | 133        | _ |
|              |                      | <del> </del>        | 1        | <del> </del>                                     | H            |          | -        | 1        |          |                | l |       | 84                 | -  | H            |          |          |          |          |          |               |                                     |     |          | 134        | _ |
|              | N.                   | $\vdash$            | T        | Ι-   | T            | Т        | ╅        |          |          |                |   |       | 85                 | 1.1.   |              |          |          |          |          |          |               |                                     | ı   |          | 135        | Ť |
|              | 36                   |                     | Т        | $\vdash$   |              |          |          |          | Т        |                | 1 |       | 35                 |  |              |          |          |          |          |          |               |                                     |     |          | 136        | _ |
|              | 134                  |                     | Г        |  | 1            |          |          |          |          |                | ĺ |       | 91                 |  |              |          |          |          |          |          |               |                                     |     |          | 137        |   |
|              | 135                  |                     |          |  | 1            |          | Γ        |          |          |                | ĺ |       | <b>358</b>         | Γ  |              |          |          |          |          |          |               |                                     |     |          | 138        |   |
|              | 139                  |                     |          |  |              |          |          |          |          |                |   |       | 89                 | ÷  |              |          |          |          |          |          |               |                                     |     |          | 139        |   |
|              | M                    |                     |          |  |              |          |          |          |          |                |   |       | 90                 |  |              |          |          |          |          |          |               |                                     |     |          | 140        |   |
|              | 1/2                  | 1                   |          |  |              |          |          |          |          |                |   |       | 9/2                | ľ  |              |          |          |          |          |          |               |                                     |     |          | 141        | _ |
|              | 1/2                  |                     |          |  | <u> </u>     | <u> </u> | L        |          |          | <u> </u>       |   |       | 32,                | $ldsymbol{ld}}}}}}$ | L_           |          |          |          |          |          |               |                                     |     | <u> </u> | 142        |   |
|              | 39<br>47<br>48<br>48 |                     | _        | <u> </u>   | <u>L</u>     | <u> </u> | <u> </u> | <u> </u> | <u> </u> |                | Į |       | <b>3 3 3 3 5 5</b> | _  | <u> </u>     | L        | Ь.       |          | L        | <u> </u> | <u> </u>      | Щ                                   |     | <u> </u> | 143        | _ |
|              | 44                   | -                   | _        | <u> </u>   | _            | _        | <u> </u> | _        | L_       | <u> </u>       | 1 | L     | 130%               | <u> </u>   |              | _        | Ш        | Ш        | Щ        | Ш        | _             | $ldsymbol{ldsymbol{ldsymbol{eta}}}$ |     | <u> </u> | 144        | _ |
|              | MB                   | Ĺ                   | <u> </u> | <del> </del>                                     | <u> </u>     | L        | <u> </u> | _        | <u> </u> | <u> </u>       |   | L_    | 90                 | 1-1  | <u> </u>     | _        | Щ        | <u> </u> |          | $\vdash$ | $\vdash$      | $\vdash$                            |     |          | 145        | _ |
|              | 46                   | ÷                   | $\vdash$ |  | L_           | <u> </u> | <u> </u> | <u> </u> | <u> </u> | L_             |   |       | 96                 | ∹إ   | $\vdash$     | <b> </b> | H        | _        | <u> </u> | <u> </u> | <u> </u>      | _                                   |     | <u> </u> | 146        | _ |
| <u> </u>     | 47                   | 1                   | $\vdash$ |  | <u> </u>     | <u> </u> | -        | <u> </u> | ├-       | <u> </u>       |   |       | 37                 | <u> </u>   | _            |          | <u> </u> | L.,      | L        |          |               |                                     |     |          | 147        | _ |
|              | 48                   | ₩                   | ⊢        | ┼  | -            | ├        | <u> </u> | <u> </u> | -        | -              |   |       | 98                 | 1.   | $\vdash$     | $\vdash$ |          |          |          |          | <del>  </del> |                                     |     | <u> </u> | 148        |   |
| -            | 49<br>50             | H                   | $\vdash$ | +-   | ├            | $\vdash$ | -        | ├—       | -        | <del> </del> — |   |       | 99<br>100          | ╨╸   | <del>-</del> | -        | Н,       |          |          |          | $\vdash$      |                                     |     |          | 149<br>150 | _ |
| L            | 100                  | LL                  | L        | Ь.   | <u> </u>     | <u> </u> |          | <u> </u> | L        | L              |   |       | 100                |  | Ļ.,          | L        |          | ш        | L        |          |               | Ц.,                                 | ı l | L        | 130        |   |

| Cli   | aim                                    |              |  |  |          | Date   | =  |              |  |  |
|-------|--|--------------|--|--|----------|--|--|--------------|--|--|
|       |  |              |  |  |          |  |  |              |  | П  |
| ᇤ     | Original                               |              |  |  |          |  |  |              |  |  |
| Final | igi                                    |              |  |  |          |  |  |              |  |  |
| ш     | ဝ                                      |              |  |  |          |  |  |              |  | 1  |
|       |  |              |  |  |          |  |  |              |  | Ш  |
|       | 101<br>102                             |              |  |  |          |  |  |              |  |  |
|       | 102                                    |              |  |  |          |  |  |              |  |  |
|       | 103                                    |              |  |  |          |  |  |              |  |  |
|       | 104                                    |              |  |  |          | Ι.   |  |              |  |  |
|       | 103<br>104<br>105                      |              |  |  |          |  | _  |              |  | П  |
|       | 106                                    |              |  |  | Н        | <u> </u>   | $\overline{}$  |              |  | Н  |
|       | 106<br>107                             |              | -  |  |          | Н  | Н  |              | -  |  |
|       | 100                                    | -            |  | ⊢  | $\vdash$ | _  | $\vdash$   | $\vdash$     | _  | Н  |
|       | 108<br>109                             |              | _  | -  |          | $\vdash$   | $\vdash$   | $\vdash$     |  | Н  |
|       | 109                                    |              | _  | -  | ⊢        | _  | $\vdash$   | -            |  | H  |
|       | 110                                    |              |  | <u> </u>   |          | ┝  | ⊢  | H            | _  | Н  |
|       | 111                                    | <u> </u>     | ļ  | _  | $\vdash$ | $\vdash$   | <u> </u>   | -            | $\vdash$   | Щ  |
|       | 112                                    | <u> </u>     | <u> </u>   | <u> </u>   | <u> </u> | <u> </u>   | <u> </u>   | <u> </u>     | <u> </u>   | Щ  |
|       | 113                                    | $\vdash$     |  | igspace  |          | ļ  | L  |              | <u> </u>   | Ш  |
|       | 110<br>111<br>112<br>113<br>114<br>115 | L            |  | _  |          | $oldsymbol{ol}}}}}}}}}}}}}}}}}}$ | L  | <u> </u>     |  |  |
|       | 115                                    | L            | L  | L  | L        | L  |  | L            | L  | $oldsymbol{ol{ol{ol}}}}}}}}}}}}}}}}}}$ |
|       | l 116                                  |              |  |  |          |  |  |              |  |  |
|       | 117<br>118<br>119                      |              |  |  |          |  |  |              |  |  |
|       | 118                                    | Г            |  |  |          |  |  |              |  |  |
|       | 119                                    |              |  |  |          |  |  |              |  | П  |
|       | 120                                    |              |  |  | -        |  |  |              |  | П  |
|       | 120<br>121                             | -            | -  | $\vdash$   |          |  | _  | _            |  | Н  |
|       | 122                                    |              |  |  | <u> </u> | _  |  |              |  | Н  |
|       | 123                                    | ┢            | -  | $\vdash$   | $\vdash$ |  | _  | _            |  | Н  |
|       | 122<br>123<br>124                      | -            |  | $\vdash$   | $\vdash$ |  | -  | -            |  | Н  |
|       | 125                                    |              | ┝  | -  |          |  | -  |              |  | Н  |
|       | 125<br>126<br>127                      | ┝            | ├─   | -  | $\vdash$ | ┢  | ╁─   |              |  | Н  |
|       | 127                                    | $\vdash$     | _  | $\vdash$   | ┝        | _  | ⊢  | -            | -  | $\vdash$   |
|       | 127                                    | ├            |  | -  | H        |  |  | _            |  | Н  |
|       | 120                                    | ⊢            | ┝  | -  | -        | -  | ⊢  |              | <u> </u>   |  |
|       | 128<br>129<br>130                      | <del> </del> |  | _  | _        | _  | ├_   |              | ⊢  | $\vdash\vdash$   |
|       | 130                                    | _            |  | <u> </u>   | _        | _  | _  | _            | lacksquare                                       | Ш  |
|       | 131<br>132                             | <u> </u>     | L  | _  | L        |  | <u> </u>   |              |  | Ш  |
|       | 132                                    | <u> </u>     | _  | _  | L        | L  | <u> </u>   | L_           | <u>L</u> .                                       | Ш  |
|       | 133<br>134                             | 匚            | <u> </u>   | <u> </u>   | <u> </u> |  | L  |              | Ь.   | Ш  |
|       | 134                                    | <u> </u>     | <u> </u>   | _  | L        | L  |  |              |  | Ш  |
|       | 135                                    | L            |  |  | L        | L  | $oldsymbol{ol}}}}}}}}}}}}}}}}$ |              | $oxedsymbol{oxed}$                               | $\bigsqcup$  |
|       | 136                                    |              | L  |  |          | L.   |  |              |  |  |
|       | 136<br>137                             |              |  |  |          |  | L  |              |  |  |
|       | 138                                    |              |  |  |          |  |  |              |  |  |
|       | 139                                    |              |  |  |          |  |  |              |  |  |
|       | 140                                    |              |  |  |          |  |  |              | Ι.   | П  |
|       | 141                                    |              |  |  |          | <u> </u>   |  |              |  | П  |
|       | 142                                    |              |  | Г  |          | Γ  |  |              |  | П  |
|       | 143                                    | Г            | Г  | Г  | $\vdash$ | Т  | Г  | Г            | Г  | П  |
| _     | 144                                    |              | <del>                                     </del> | T  |          |  | <del>                                     </del>   | Ι            | $\vdash$   | Н  |
|       | 145                                    | <u> </u>     | <del>                                     </del> | $\vdash$   | t        | $\vdash$   | Ι-   | <u> </u>     |  | H  |
|       | 146                                    | $\vdash$     | $\vdash$   | <del>                                     </del> | -        | -  | $\vdash$   | $\vdash$     | <del>                                     </del> | $\vdash$   |
|       | 147                                    | $\vdash$     | $\vdash$   | $\vdash$   | ┢        | $\vdash$   | $\vdash$   | -            | -  | $\vdash$   |
|       | 148                                    | $\vdash$     | $\vdash$   | $\vdash$   | -        | $\vdash$   | $\vdash$   | -            |  | Н  |
|       | 149                                    |              | ├  | $\vdash$   | -        | -  | ┢  | -            | $\vdash$   | $\vdash$   |
|       |  | ⊢            | <u> </u>   | ⊢  | -        | $\vdash$   | $\vdash$   | <del> </del> |  | Н  |
|       | 150                                    | <u> </u>     | L  | <u> </u>   | <u> </u> | <u> </u>   | ட  | <u> </u>     | L_   | Ш  |